

## ***Appendix 11-B***

### ***24-HOUR RAINFALL DEPTH DATA FOR VIRGINIA***

#### ***Table of Contents***

#### ***TABLES***

Table 11-B.1. NRCS Implementation of NOAA's ATLAS 14 Rainfall Data for Virginia	11-B-2
---	--------

#### ***FIGURES***

Figure 11-B-1. NRCS Rainfall Zone Map for Albermarle County, Virginia	11-B-6
Figure 11-B.2. NRCS Rainfall Zone Map for Augusta County, Virginia	11-B-7
Figure 11-B.3. NRCS Rainfall Zone Map for Bedford County, Virginia	11-B-8
Figure 11-B.4. NRCS Rainfall Zone Map for Carroll County, Virginia	11-B-9
Figure 11-B.5. NRCS Rainfall Zone Map for Floyd County, Virginia	11-B-10
Figure 11-B.6. NRCS Rainfall Zone Map for Giles County, Virginia	11-B-11
Figure 11-B.7. NRCS Rainfall Zone Map for Grayson County, Virginia	11-B-12
Figure 11-B.8. NRCS Rainfall Zone Map for Greene County, Virginia	11-B-13
Figure 11-B.9. NRCS Rainfall Zone Map for Madison County, Virginia	11-B-14
Figure 11-B.10. NRCS Rainfall Zone Map for Montgomery County, Virginia	11-B-15
Figure 11-B.11. NRCS Rainfall Zone Map for Page County, Virginia	11-B-16
Figure 11-B.12. NRCS Rainfall Zone Map for Patrick County, Virginia	11-B-17
Figure 11-B.13. NRCS Rainfall Zone Map for Roanoke County, Virginia	11-B-18
Figure 11-B.14. NRCS Rainfall Zone Map for Rockbridge County, Virginia	11-B-19
Figure 11-B.15. NRCS Rainfall Zone Map for Rockingham County, Virginia	11-B-20
Figure 11-B.16. NRCS Rainfall Zone Map for Scott County, Virginia	11-B-21

**Table 11-B.1** provides the 24-hour rainfall depths for Virginia counties and major cities. For counties having more than one rainfall zone, consult the appropriate map figures following the table for the approximate boundaries of the various zones.

**Table 11-B.1. NRCS Implementation of NOAA's ATLAS 14 Rainfall Data for Virginia**

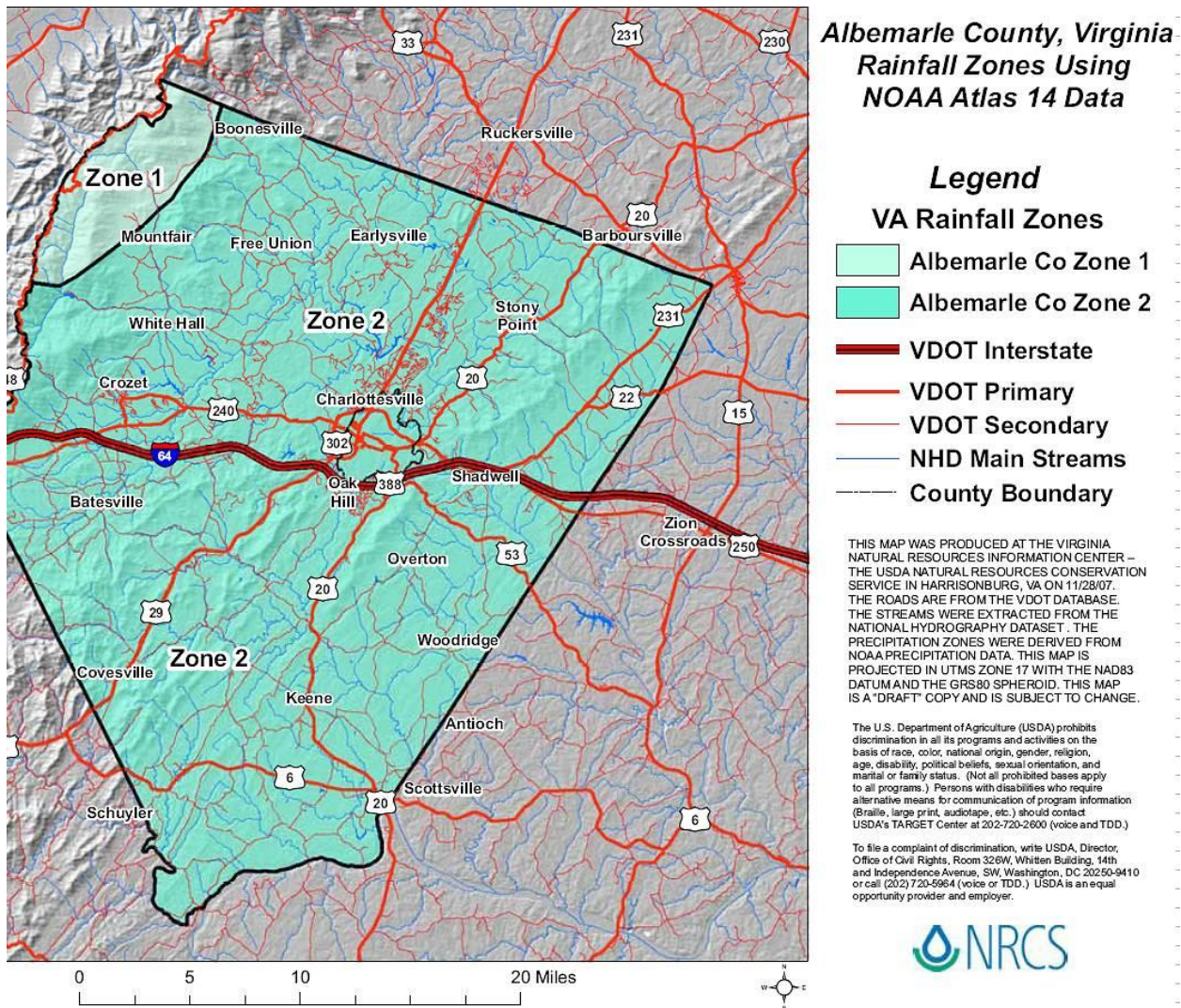
County	Storm Return Frequency (Years)						
	1	2	5	10	25	50	100
Accomack	2.67	3.25	4.23	5.07	6.36	7.48	8.75
Albermarle (Zone 1)	3.42	4.14	5.27	6.21	7.59	8.77	10.10
Albermarle (Zone 2)	3.00	3.63	4.63	5.48	6.72	7.79	8.96
Alleghany	2.39	2.88	3.60	4.20	5.05	5.77	6.53
Amelia	2.73	3.30	4.22	5.00	6.15	7.13	8.20
Amherst	2.80	3.39	4.32	5.09	6.22	7.17	8.21
Appomattox	2.82	3.42	4.37	5.17	6.36	7.37	8.49
Arlington	2.69	3.15	4.05	4.84	6.06	7.14	8.37
August (Zone 1)	2.48	3.00	3.78	4.43	5.38	6.17	7.02
Augusta (Zone 2)	2.98	3.61	4.59	5.40	6.58	7.58	8.67
Bath	2.49	3.00	3.76	4.38	5.27	6.01	6.80
Bedford (Zone 1)	3.10	3.76	4.80	5.66	6.92	8.01	9.20
Bedford (Zone 2)	2.76	3.35	4.27	5.04	6.17	7.13	8.18
Bland	2.16	2.58	3.13	3.58	4.19	4.68	5.19
Botetourt	2.60	3.15	4.00	4.70	5.71	6.57	7.50
Brunswick	2.78	3.37	4.33	5.13	6.29	7.27	8.33
Buchanan	2.18	2.60	3.17	3.65	4.34	4.91	5.51
Buckingham	2.78	3.37	4.31	5.09	6.26	7.26	8.36
Campbell	2.75	3.33	4.25	5.03	6.18	7.17	8.25
Caroline	2.68	3.25	4.19	5.00	6.24	7.33	8.56
Carroll (Zone 1)	2.29	2.76	3.48	4.05	4.85	5.50	6.18
Carroll (Zone 2)	2.62	3.17	4.02	4.71	5.68	6.48	7.33
Carroll (Zone 3)	2.95	3.57	4.55	5.35	6.50	7.46	8.50
Carroll (Zone 4)	3.36	4.97	5.20	6.13	7.49	8.65	9.92
Charles City	2.82	3.42	4.41	5.25	6.49	7.57	8.76
Charlotte	2.71	3.28	4.20	4.97	6.10	7.08	8.14
Chesapeake (city)	3.03	3.69	4.76	5.67	7.01	8.17	9.44
Chesterfield	2.77	3.35	4.29	5.09	6.27	7.28	8.39
Clarke	2.41	2.90	3.64	4.25	5.16	5.92	6.75
Craig	2.40	2.89	3.64	4.25	5.12	5.86	6.65
Culpeper	2.70	3.27	4.19	4.99	6.19	7.24	8.42
Cumberland	2.71	3.28	4.19	4.96	6.09	7.07	8.14
Dickenson	2.21	2.63	3.22	3.72	4.44	5.04	5.69
Dinwiddie	2.80	3.39	4.35	5.15	6.32	7.30	8.38
Essex	2.67	3.25	4.20	5.03	6.29	7.40	8.64
Fairfax	2.57	3.11	4.00	4.78	5.98	7.05	8.25

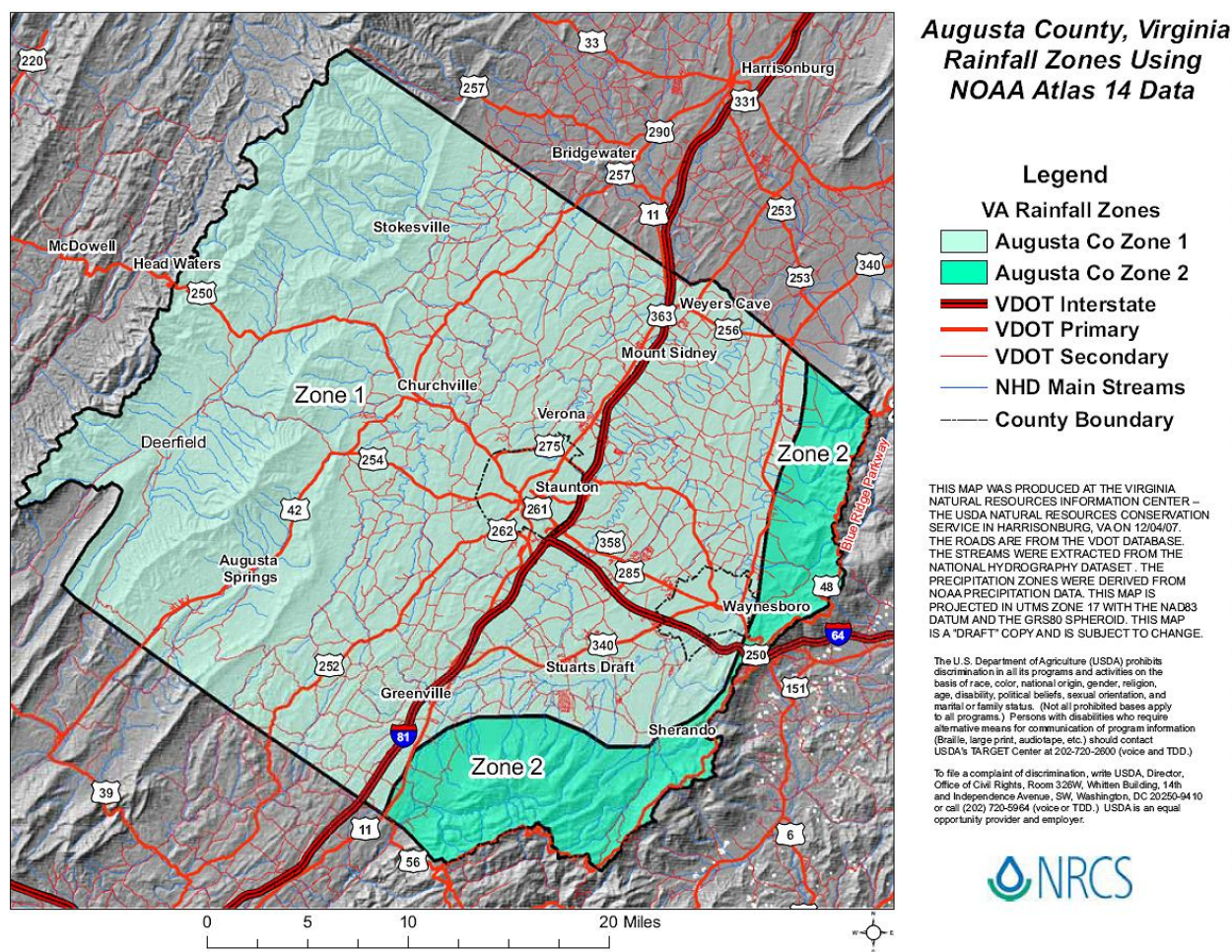
County	Storm Return Frequency (Years)						
	1	2	5	10	25	50	100
Fauquier	2.59	3.13	3.99	4.74	5.88	6.88	7.99
Floyd (Zone 1)	2.55	3.09	3.93	4.62	5.64	6.49	7.40
Floyd (Zone 2)	2.86	3.47	4.42	5.21	6.37	7.34	8.41
Floyd (Zone 3)	3.38	4.11	5.24	6.19	7.59	8.78	10.09
Floyd (Zone 4)	3.81	4.63	5.92	7.00	8.59	9.97	11.49
Fluvanna	2.68	3.25	4.15	4.91	6.03	7.00	8.05
Franklin	2.83	3.43	4.37	5.16	6.32	7.31	8.39
Frederick	2.36	2.83	3.53	4.11	4.96	5.68	6.46
Giles (Zone 1)	2.11	2.53	3.14	3.63	4.34	4.92	5.53
Giles (Zone 2)	2.34	2.81	3.51	4.08	4.90	5.57	6.31
Gloucester	2.87	3.49	4.52	5.41	6.73	7.89	9.19
Goochland	2.71	3.28	4.19	4.97	6.12	7.11	8.19
Grayson (Zone 1)	3.24	3.89	4.83	5.59	6.68	7.59	8.57
Grayson (Zone 2)	2.46	2.95	3.66	4.22	5.00	5.64	6.29
Grayson (Zone 3)	2.59	3.13	3.94	4.59	5.50	6.24	7.02
Greene (Zone 1)	3.38	4.09	5.19	6.11	7.47	8.63	9.92
Greene (Zone 2)	3.05	3.69	4.70	5.54	6.79	7.85	9.03
Greensville	2.74	3.32	4.28	5.08	6.25	7.23	8.31
Halifax	2.70	3.26	4.15	4.89	5.96	6.86	7.84
Hampton (city)	2.93	3.57	4.62	5.53	6.87	8.04	9.33
Hanover	2.71	3.28	4.21	5.01	6.21	7.26	8.42
Henrico	2.75	3.33	4.27	5.06	6.26	7.28	8.42
Henry	2.89	3.50	4.47	5.29	6.49	7.51	8.63
Highland	2.44	2.93	3.61	4.18	5.01	5.69	6.42
Isle of Wight	2.95	3.59	4.64	5.53	6.84	7.96	9.20
James City	2.90	3.53	4.56	5.45	6.75	7.89	9.15
King and Queen	2.72	3.31	4.28	5.11	6.38	7.49	8.73
King George	2.62	3.19	4.12	4.94	6.19	7.28	8.52
King William	2.70	3.28	4.23	5.05	6.30	7.38	8.59
Lancaster	2.74	3.33	4.33	5.19	6.49	7.63	8.91
Lee	2.56	3.05	3.71	4.26	5.03	5.68	6.38
Loudoun	2.53	3.05	3.89	4.61	5.70	6.64	7.70
Louisa	2.73	3.31	4.23	5.01	6.18	7.18	8.28
Lunenburg	2.72	3.29	4.21	4.99	6.12	7.09	8.15
Lynchburg (city)	2.75	3.33	4.26	5.03	6.17	7.14	8.20
Madison (Zone 1)	3.36	4.07	5.18	6.10	7.46	8.62	9.91
Madison (Zone 2)	2.87	3.48	4.44	5.25	6.45	7.48	8.61
Mathews	2.83	3.45	4.47	5.36	6.70	7.87	9.17
Mecklenburg	2.68	3.25	4.14	4.87	5.94	6.84	7.82
Middlesex	2.77	3.37	4.37	5.24	6.54	7.68	8.96
Montgomery (Zone 1)	2.00	2.42	3.06	3.58	4.34	4.97	5.64

County	Storm Return Frequency (Years)						
	1	2	5	10	25	50	100
Montgomery (Zone 2)	2.28	2.76	3.50	4.11	4.99	5.73	6.52
Montgomery (Zone 3)	2.60	3.15	4.01	4.72	5.75	6.61	7.55
Nelson	2.99	3.62	4.62	5.45	6.66	7.70	8.83
New Kent	2.78	3.37	4.35	5.19	6.45	7.53	8.75
Newport News (city)	2.94	3.58	4.63	5.53	6.86	8.01	9.28
Norfolk (city)	2.94	3.57	4.62	5.50	6.82	7.95	9.20
Northampton	2.74	3.33	4.33	5.19	6.48	7.61	8.88
Northumberland	2.69	3.27	4.25	5.10	6.39	7.51	8.78
Nottoway	2.73	3.31	4.23	5.00	6.15	7.12	8.19
Orange	2.76	3.34	4.27	5.07	6.27	7.30	8.46
Page (Zone 1)	2.44	2.94	3.71	4.35	5.28	6.07	6.93
Page (Zone 2)	3.06	3.70	4.69	5.52	6.73	7.77	8.90
Patrick (Zone 1)	3.79	4.61	5.89	6.97	8.57	9.94	<b>11.46</b>
Patrick (Zone 3)	3.06	3.71	4.73	5.59	6.85	7.93	9.10
Petersburg (city)	2.80	3.40	4.35	5.16	6.35	7.36	8.46
Pittsylvania	2.78	3.37	4.29	5.07	6.20	7.17	8.23
Poquoson (city)	2.93	3.56	4.61	5.42`	6.87	8.05	9.35
Portsmouth (city)	2.96	3.61	4.66	5.55	6.87	8.01	9.27
Powhatan	2.71	3.28	4.20	4.97	6.12	7.11	8.19
Prince Edward	2.74	3.32	4.24	5.02	6.18	7.16	8.25
Prince George	2.81	3.41	4.39	5.21	6.42	7.45	8.58
Prince William	2.51	3.04	3.91	4.67	5.84	6.86	8.03
Pulaski	2.03	2.46	3.10	3.63	4.39	5.02	5.69
Rappahannock	2.74	3.31	4.22	4.98	6.12	7.10	8.18
Richmond (city)	2.76	3.34	4.28	5.08	6.27	7.29	8.42
Richmond	2.70	3.29	4.26	5.11	6.40	7.52	8.80
Roanoke (Zone 1)	2.37	2.87	3.64	4.27	5.19	5.96	6.78
Roanoke (Zone 2)	2.62	3.17	4.03	4.74	5.77	6.64	7.58
Rockbridge (Zone 1)	2.54	3.07	3.90	4.58	5.57	6.39	7.29
Rickbridge (Zone 2)	2.94	3.56	4.53	5.33	6.48	7.46	8.51
Rockingham (Zone 1)	2.27	2.73	3.43	4.03	4.91	5.66	6.49
Rockingham (Zone 2)	3.06	3.69	4.68	5.50	6.69	7.72	8.84
Russell	2.20	2.62	3.17	3.62	4.27	4.80	5.36
Scott (Zone 1)	2.39	2.84	3.43	3.91	4.59	5.15	5.75
Scott (Zone 2)	2.25	2.67	3.18	3.59	4.14	4.58	5.02
Shenandoah	2.31	2.78	3.48	4.07	4.94	5.69	6.50
Smyth	2.34	2.78	3.35	3.81	4.44	4.95	5.47
Southampton	2.87	3.49	4.50	5.35	6.60	7.66	8.83
Spotsylvania	2.66	3.22	4.14	4.93	6.13	7.19	8.37
Stafford	2.58	3.11	4.00	4.79	5.99	7.05	8.25
Suffolk (city)	2.99	3.64	4.70	5.59	6.91	8.04	9.28

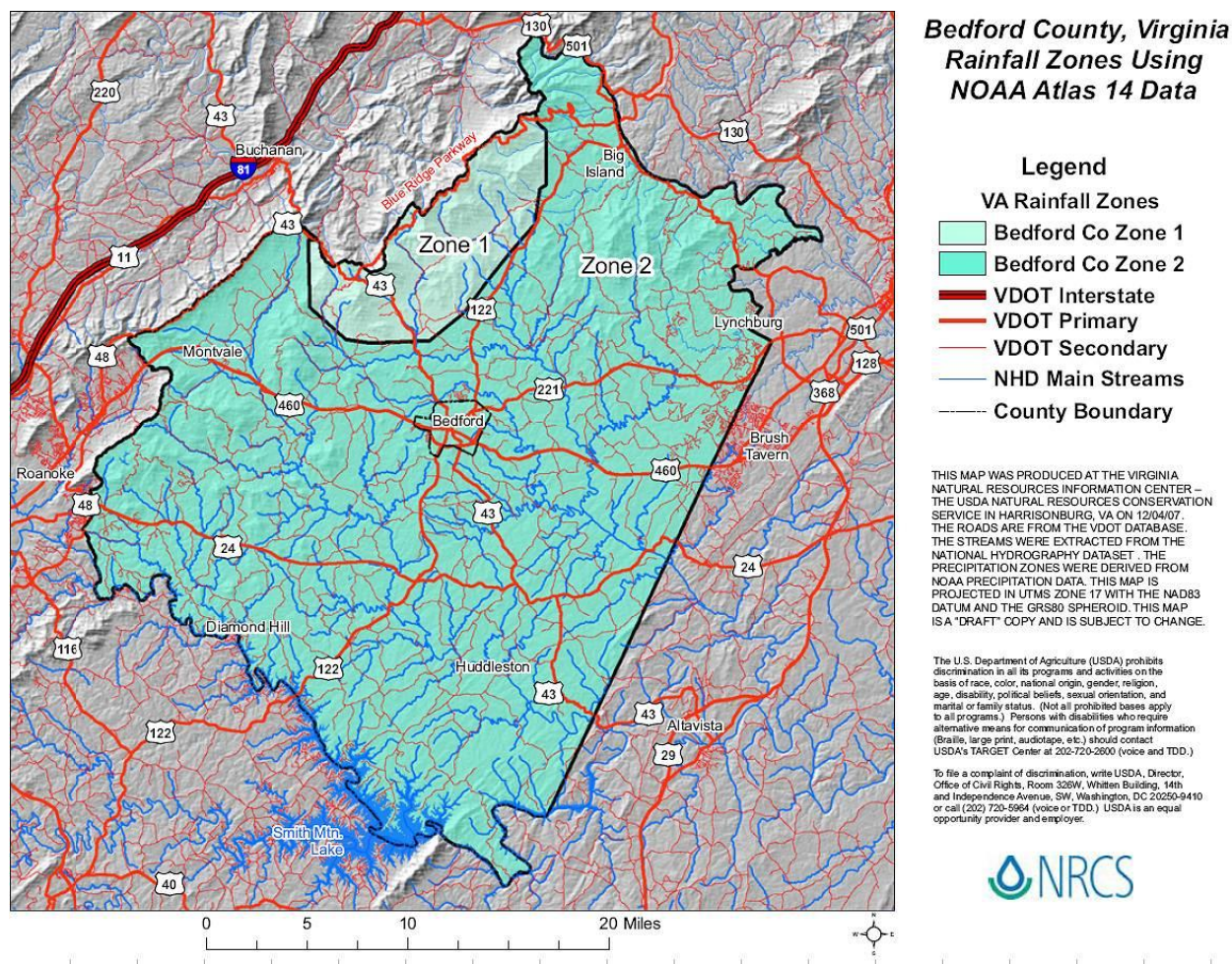
County	Storm Return Frequency (Years)						
	1	2	5	10	25	50	100
Surry	2.90	3.52	4.55	5.42	6.70	7.80	9.02
Sussex	2.85	3.46	4.45	5.29	6.50	7.52	8.03
Tazewell	2.16	2.56	3.09	3.52	4.12	4.61	5.11
Virginia Beach (city)	3.01	3.67	4.74	5.65	6.99	8.15	9.42
Warren (Zone 1)	2.48	2.99	3.78	4.43	5.38	6.19	7.08
Warren (Zone 2)	2.84	3.43	4.35	5.11	6.25	7.23	8.31
Washington	2.21	2.62	3.13	3.54	4.10	4.54	4.99
Westmoreland	2.66	3.24	4.20	5.04	6.31	7.42	8.68
Wise	2.29	2.73	3.33	3.85	4.59	5.21	5.87
Wythe	2.13	2.55	3.13	3.60	4.24	4.75	5.27
York	2.93	3.56	4.61	5.51	6.84	8.00	9.28

Source: USDA-NRCS State Office, Richmond, VA

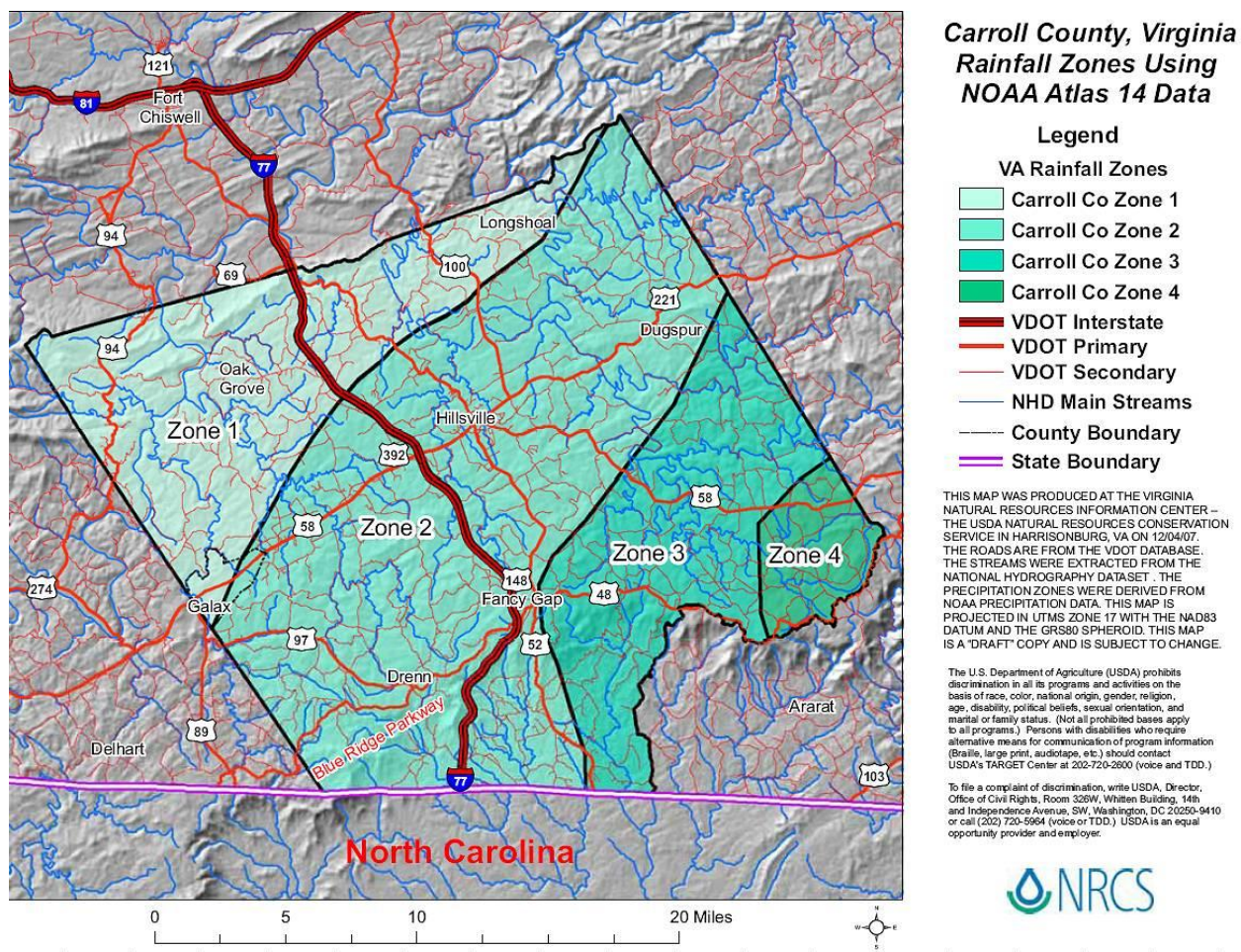




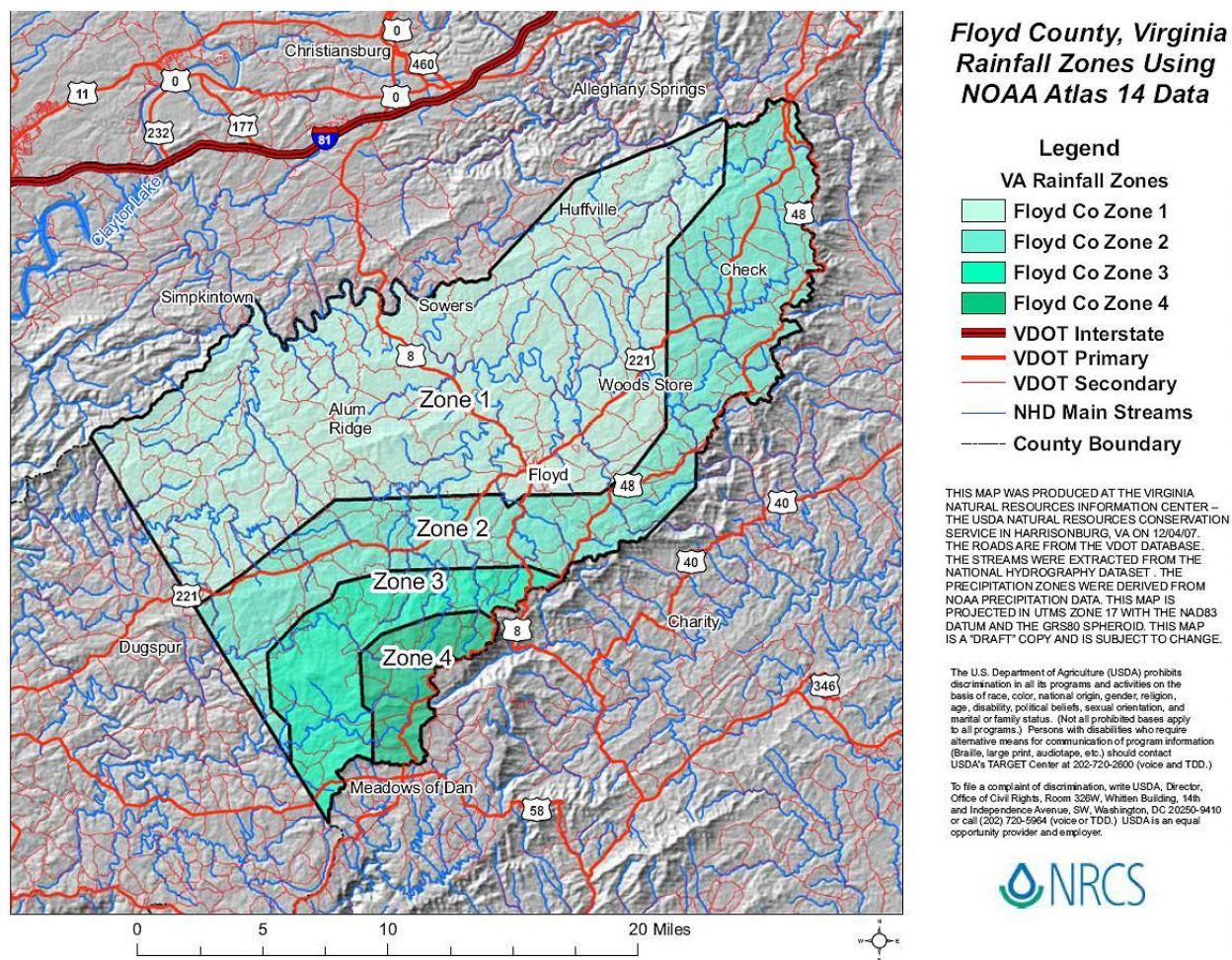
**Figure 11-B.2. NRCS Rainfall Zone Map for Augusta County, Virginia**



**Figure 11-B.3. NRCS Rainfall Zone Map for Bedford County, Virginia**



**Figure 11-B.4. NRCS Rainfall Zone Map for Carroll County, Virginia**



**Figure 11-B.5. NRCS Rainfall Zone Map for Floyd County, Virginia**

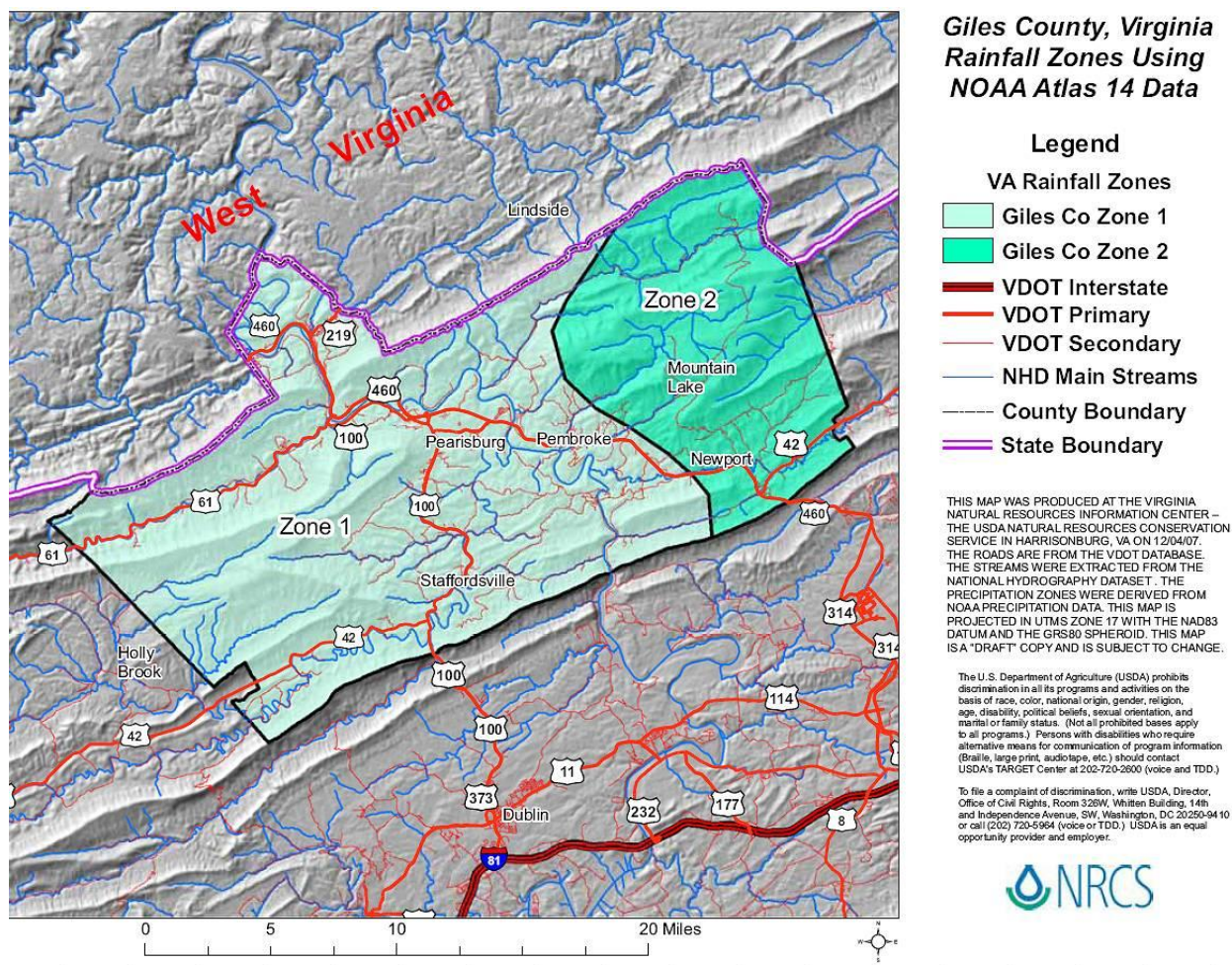
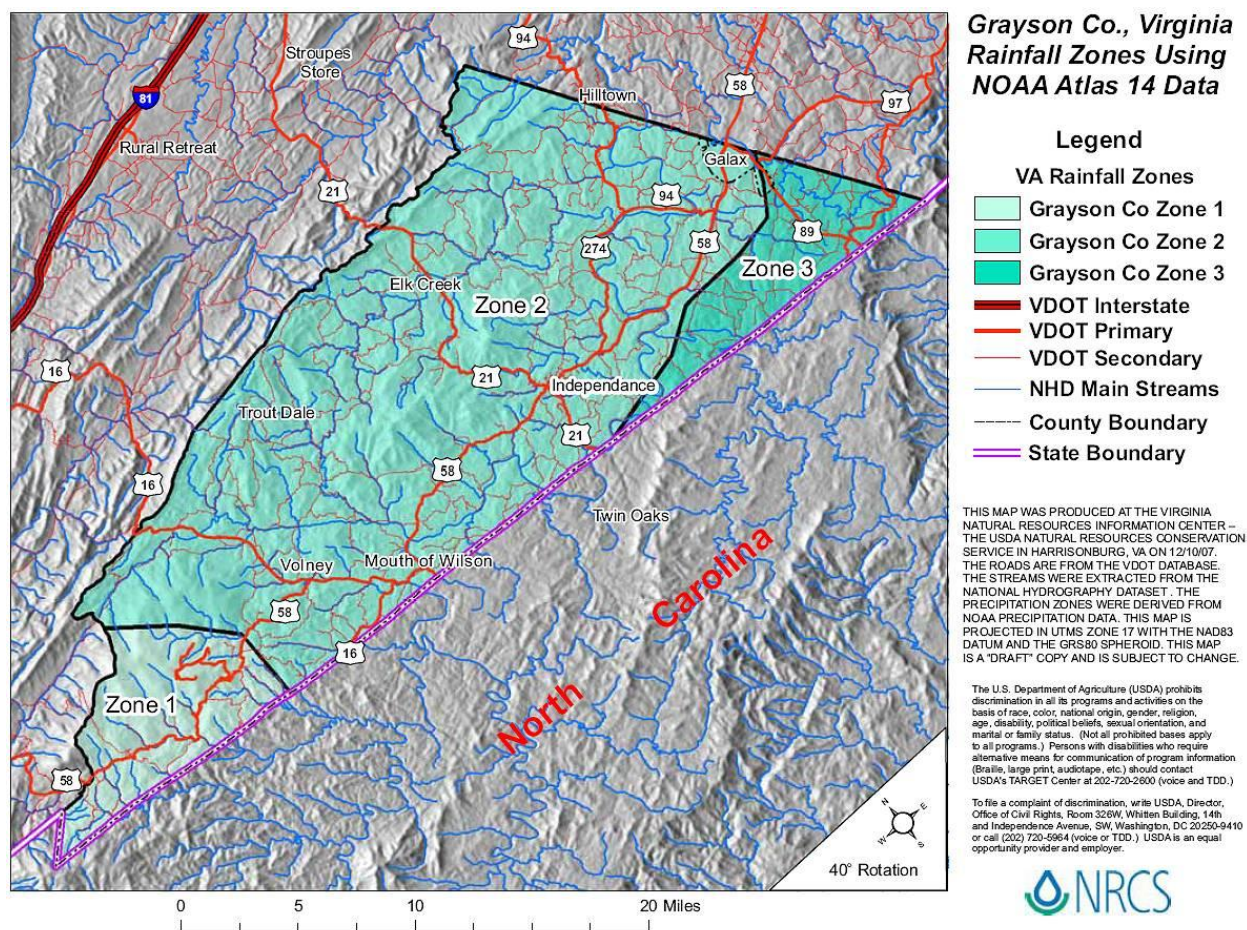
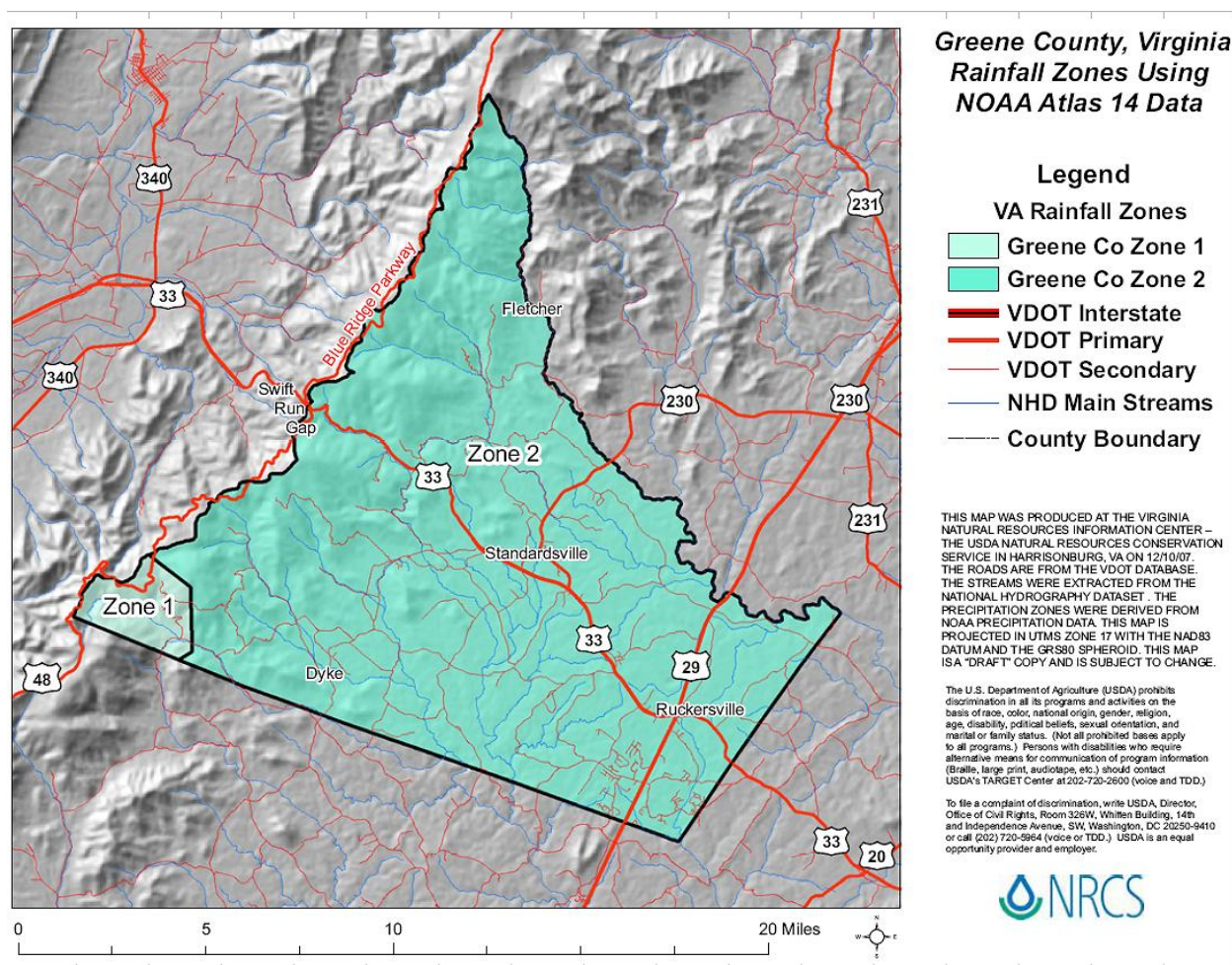


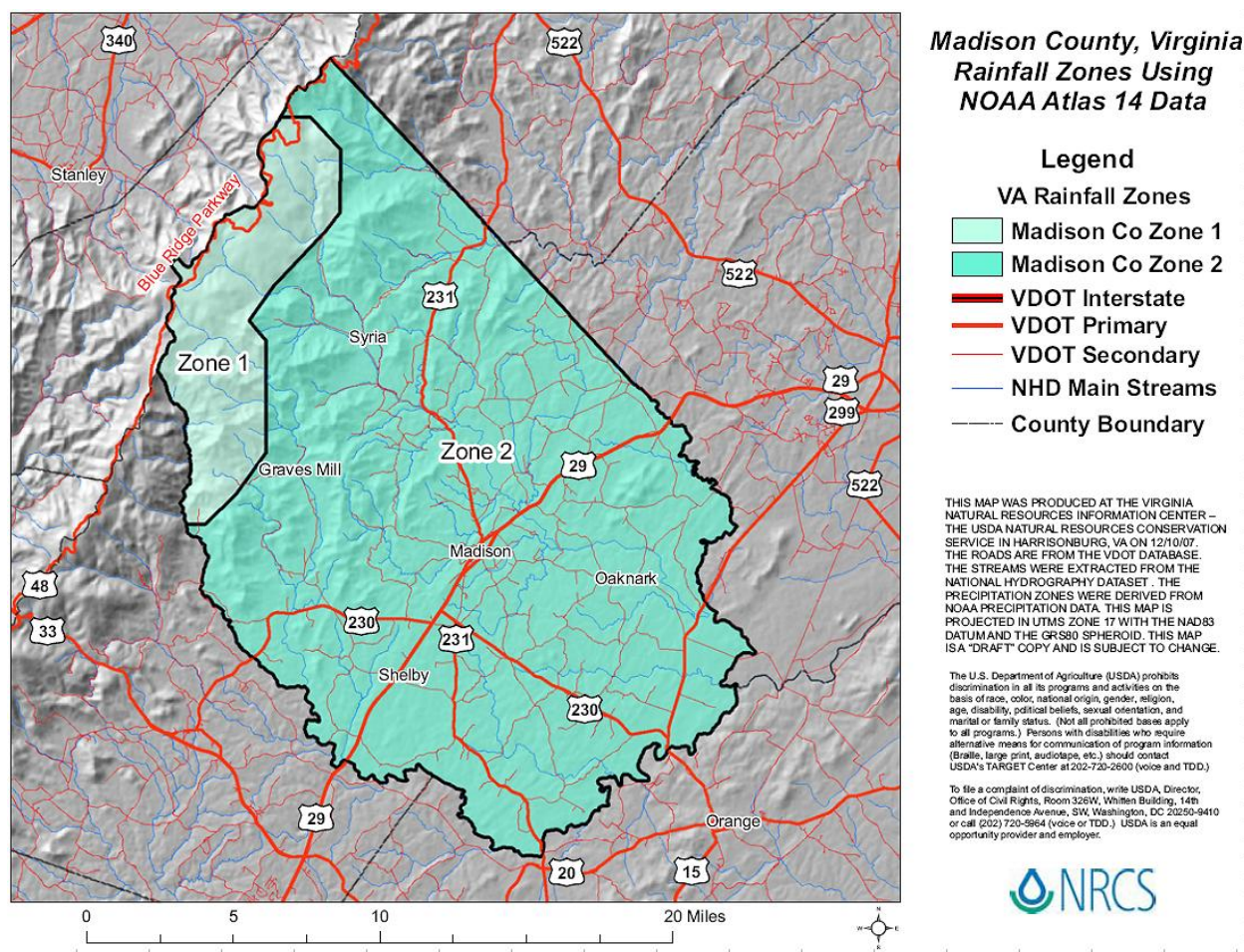
Figure 11-B.6. NRCS Rainfall Zone Map for Giles County, Virginia



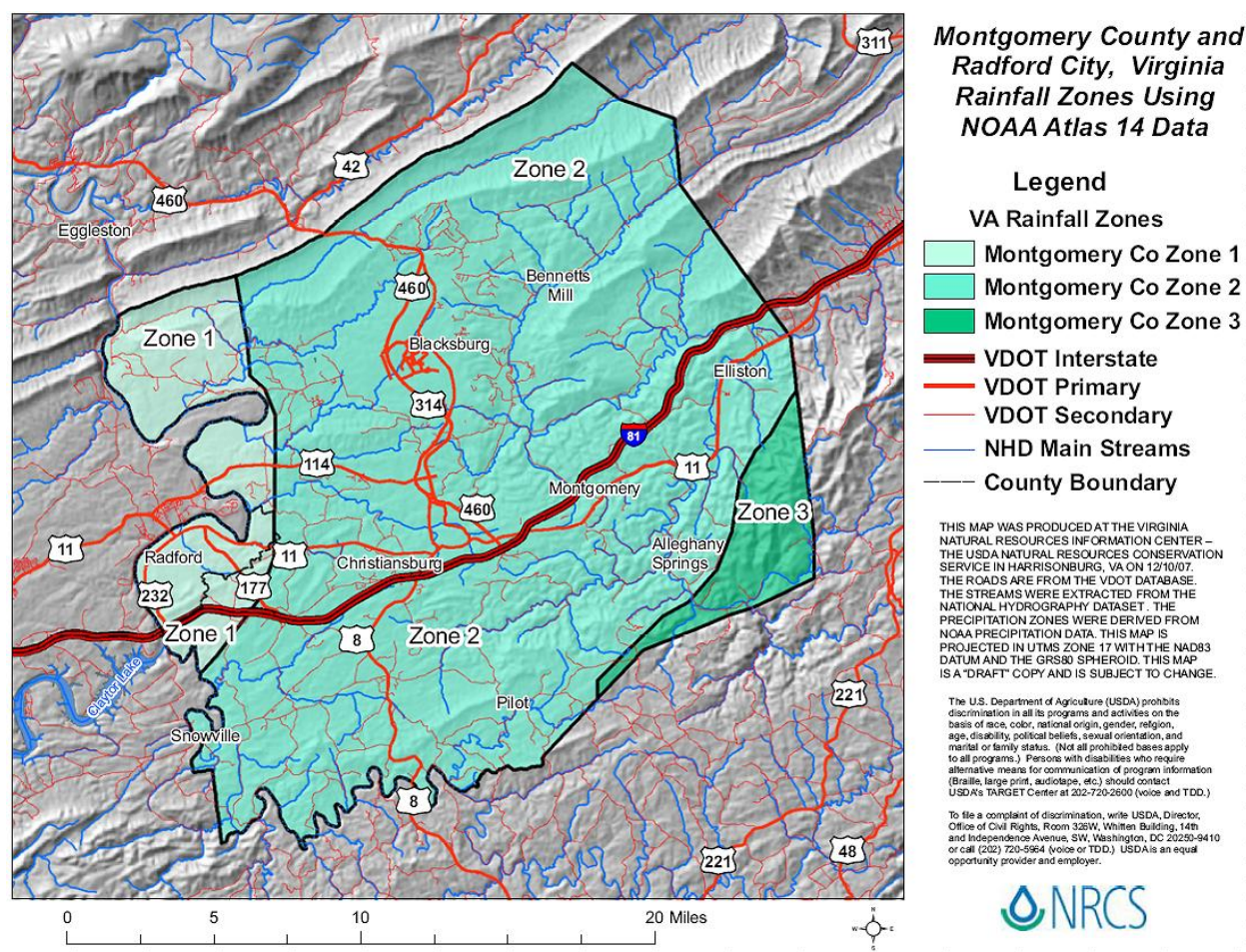
**Figure 11-B.7. NRCS Rainfall Zone Map for Grayson County, Virginia**



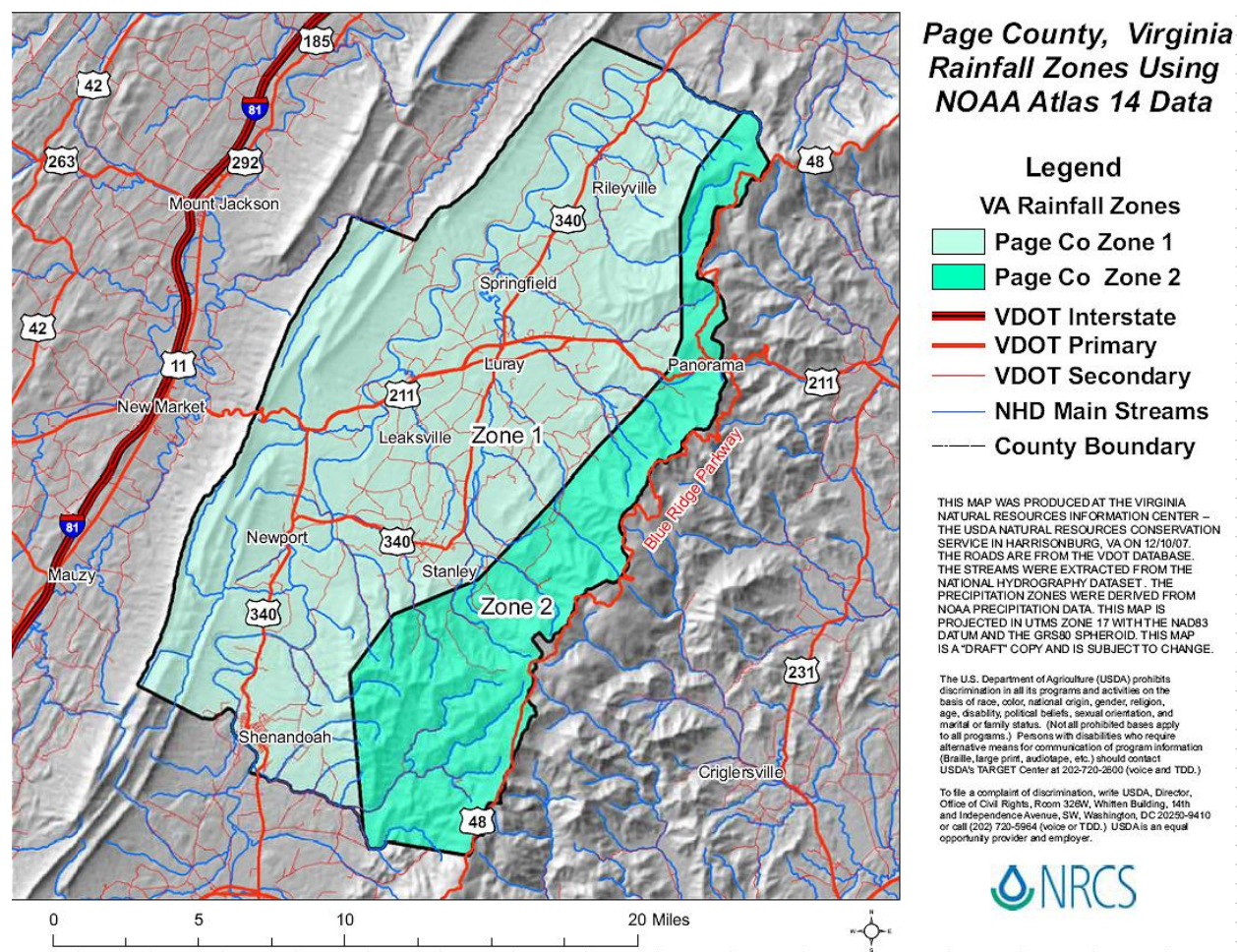
**Figure 11-B.8. NRCS Rainfall Zone Map for Greene County, Virginia**



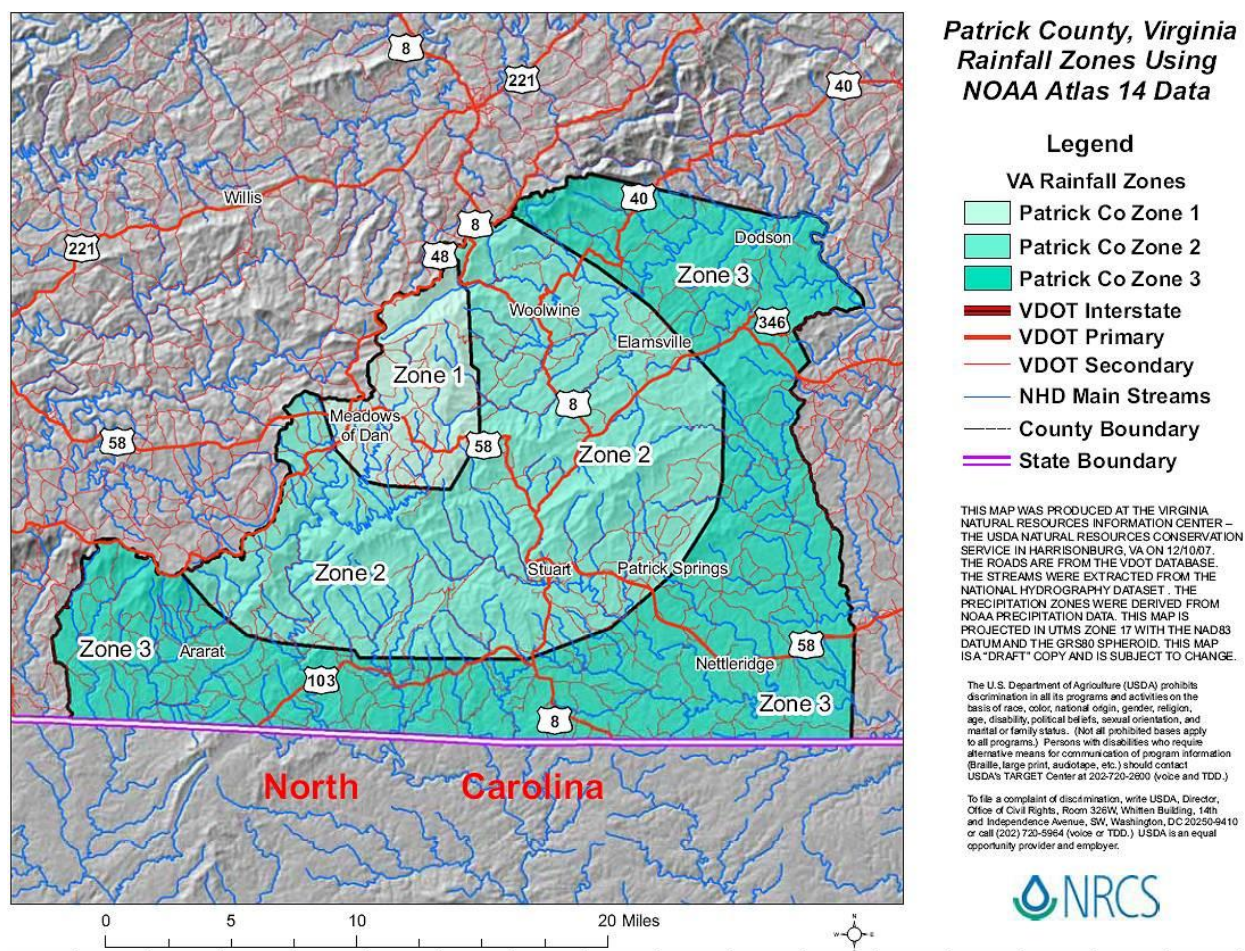
**Figure 11-B.9. NRCS Rainfall Zone Map for Madison County, Virginia**



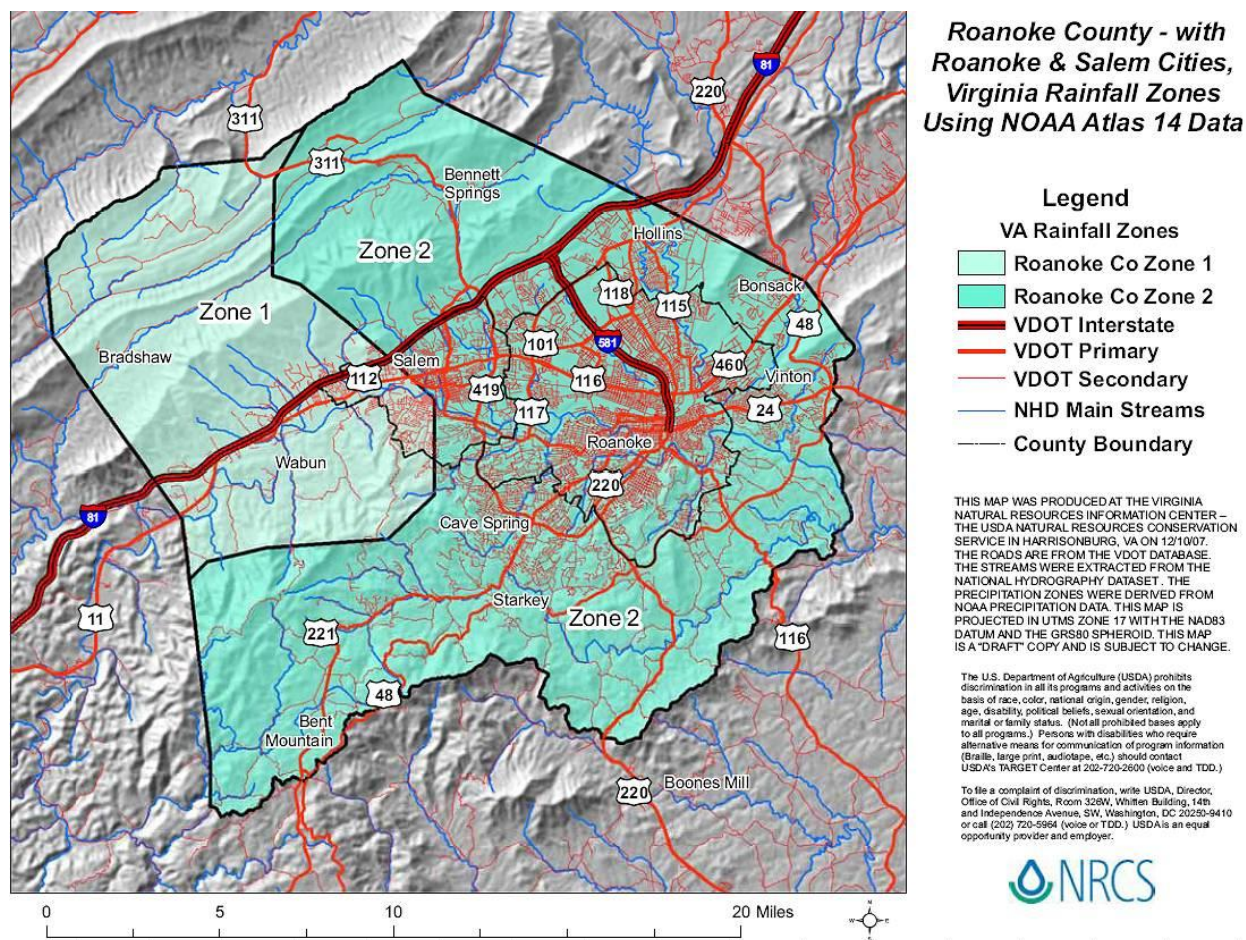
**Figure 11-B.10. NRCS Rainfall Zone Map for Montgomery County, Virginia**



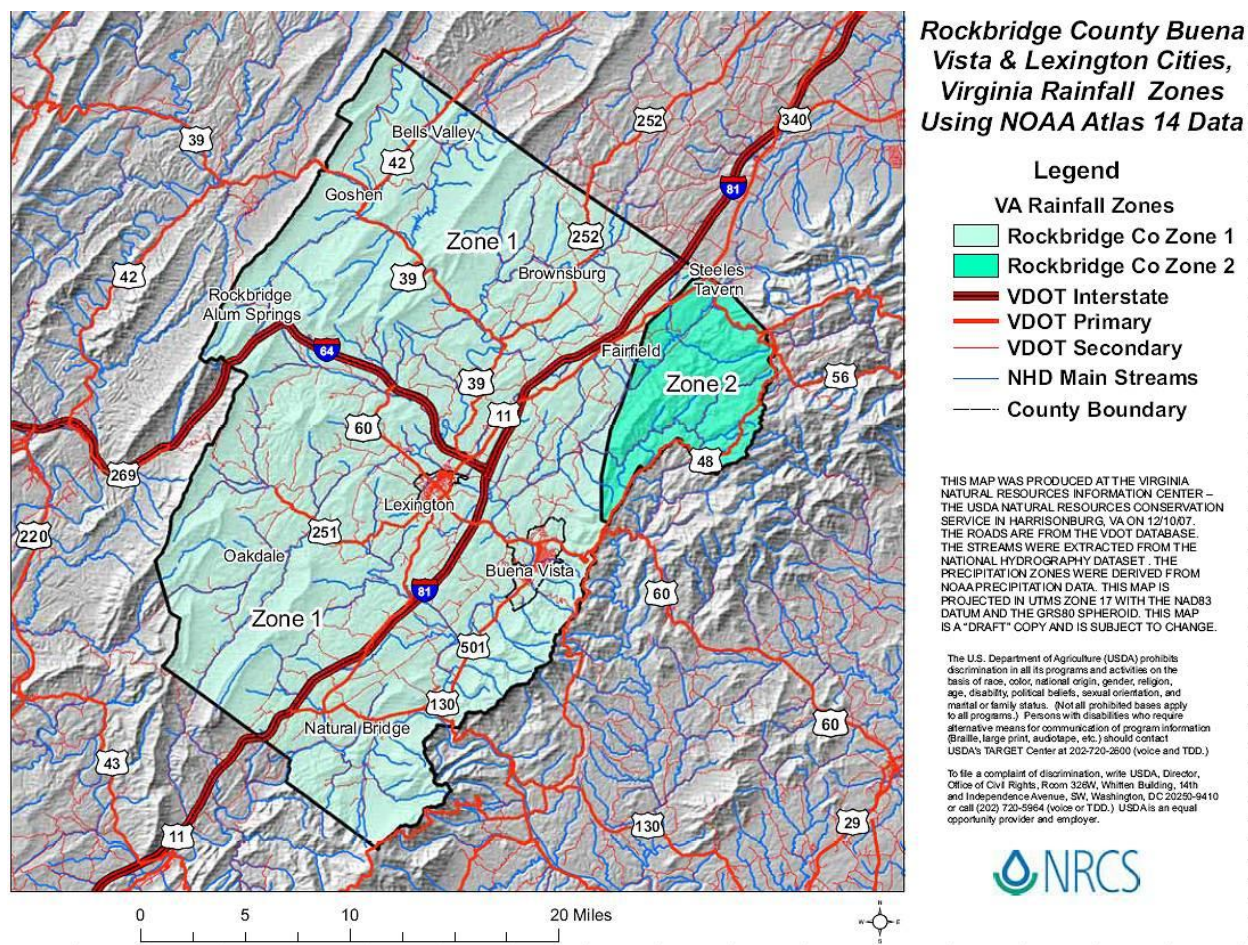
**Figure 11-B.11. NRCS Rainfall Zone Map for Page County, Virginia**



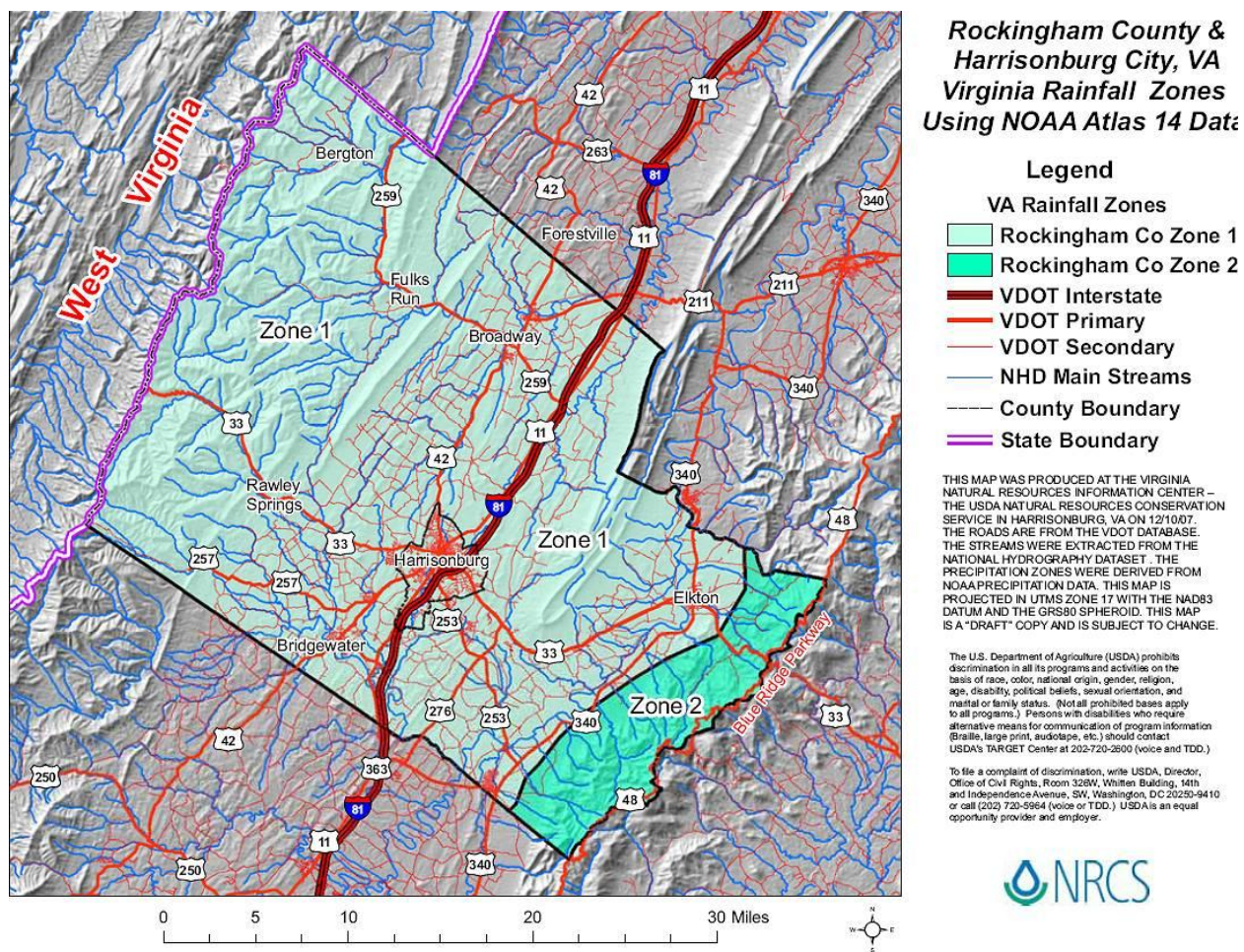
**Figure 11-B.12. NRCS Rainfall Zone Map for Patrick County, Virginia**



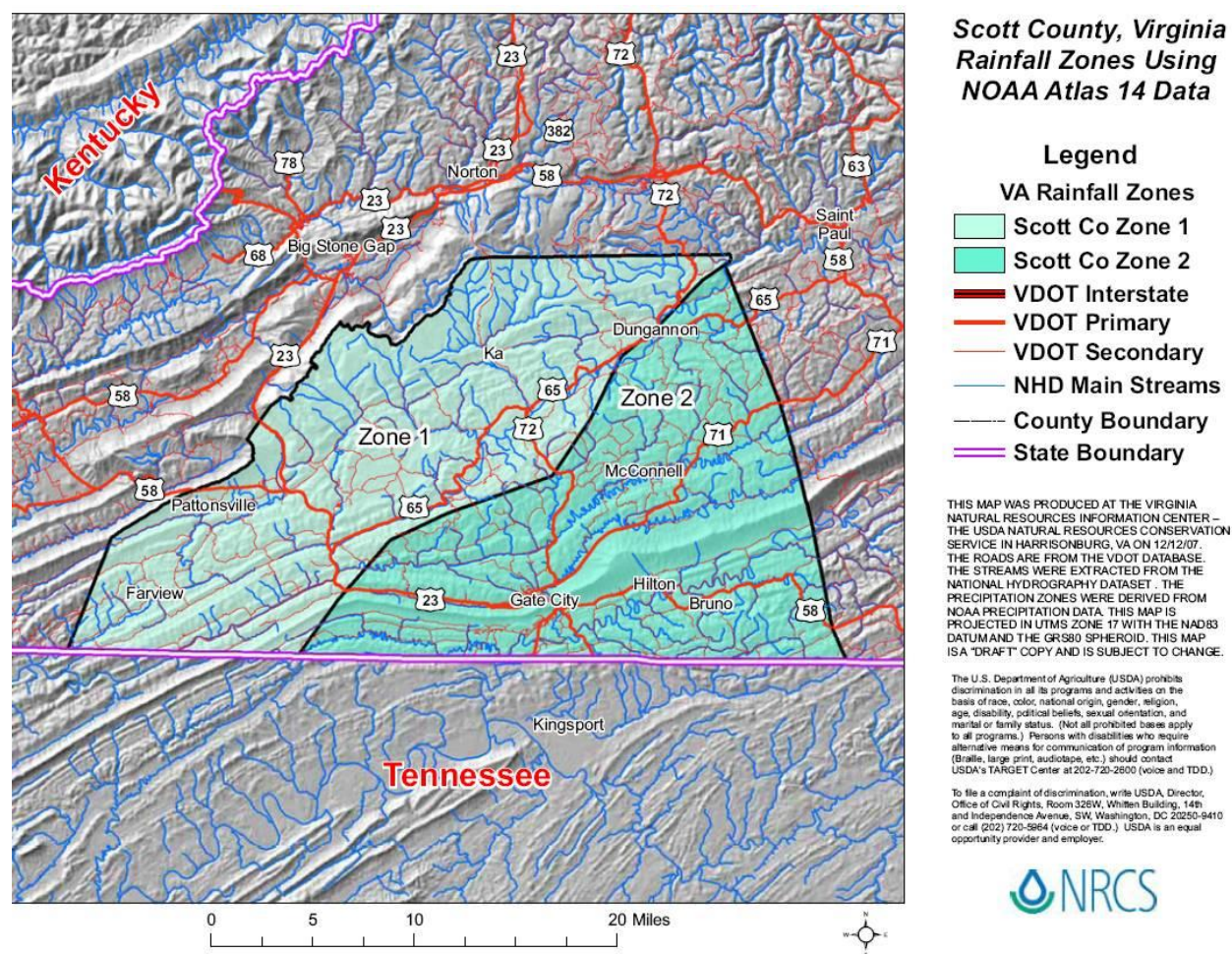
**Figure 11-B.13. NRCS Rainfall Zone Map for Roanoke County, Virginia**



**Figure 11-B.14. NRCS Rainfall Zone Map for Rockbridge County, Virginia**



**Figure 11-B.15. NRCS Rainfall Zone Map for Rockingham County, Virginia**



**Figure 11-B.16. NRCS Rainfall Zone Map for Scott County, Virginia**